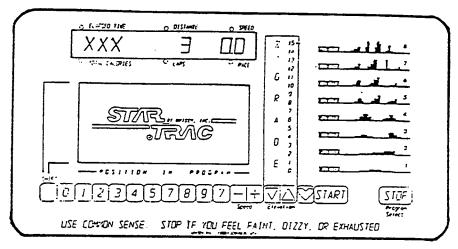


## **Engineering Mode:**

### Eprom 2.3 SN# 402596 - 404000.

Models: 3050/4000/4010/4020



Warning: Do not stand on the running belt while performing these tests.

#### I. Engaging Engineering Mode:

- Press and hold the "0", "1" & "START" keys together. While holding the "0" & "START" keys down, release the "1" key.
- The display will read: ENGINEERING

#### Using Engineering Mode Keys:

- ELEVATION UP/DOWN KEYS: Displays the next or previous parameter.
- SPEED +/-: Increments/decrements the the displayed parameter.
- START KEY: Saves the value if changed in the displayed parameter in EEPROM.
- STOP KEY: Restarts the console.
- 0 9 KEYS: Enters new parameter values.
   (Exception: If GRAPH or UNITS parameters are displayed, key 5 starts DISPLAY TEST and key 8 starts MOTOR TEST.)
- HEART: Displays parameter's default value, except for LSTDCK and LSTBLT. In these two cases, the value of miles is displayed when HEART key is pressed.

#### II. Parameters:

Engineering parameters are listed below in the order which they appear when the ELEVATION UP key is pressed successively after entering Engineering Mode.

User may customize the following variables, displayed with this symbol  $\square$ .

Manufacturer defaults are shown in ( ).

- ☐ UNITS: Options: 0/1
  - (1) 0 = English 1 = Metric
- $\square$  HRT: Options: 0/1/2
  - (0) 0 = No heart sense 1= Polar sense 2 = Contact heart sense
- ☐ EL REV: 0 255
  - (76) 0 = disables the elevation system.
- ☐ 10 REV: 22.0 74.0
  - (29.1) Distance in inches of belt travel, per 10 flywheel revolutions.

    27.5" =1.6" diameter motor pulley
    29.1" =1.7" diameter motor pulley
    30.6" =1.8" diameter motor pulley
    35.8"=2.1" for 220v metric units.
- ☐ CNT/RV: Notches on the flywheel, or (31) windows on the RPM Disc.

31= Magnetic/flywheel 125= Optical RPM & Disc

- ☐ MN SPD: 0.1 1.9
  - (.5) Minimum speed in kmh or mph.
- ☐ MX SPD: 2.0 20.0
  - (10.0) Maximum speed in kmh or mph.

## **Engineering Mode:**

Models: 3050/4000/4010/4020

MN PWM:2 - 55

Duty cycle to obtain MIN SPD kmh or mph. (NOTE: .5 mph & .5 kmh are different speeds and therefore will need different values). This value will be set automatically during Auto Cali in Test Mode.

• 1/2 MAX: 0 - 130

This is set automatically in Auto Cali.

MX PWM: 86 - 255

Duty Cycle to obtain MAX SPD This value is also set automatically during Auto Cali in Test Mode.

☐ WEIGHT: 0 - 399

(155) User's weight for calorie data.

☐ TIME: 86 - 255

(99) Max. time allowed for a prog. including warm up & cool down. Depending on cust. preference.

- OP HRS: 0 6553.5
  - (0) Number of hours treadmill has been in operation.
- DIST: 0 65535

(0) Distance recorded in the EPROM.

- LSTDCK: 0 65535
  - Number of miles when deck last serviced or belt rewaxed. ♥ key will automaticly insert the miles.
- LSTBLT: 0 65535
  - (0) Number of miles when belt last replaced. ♥ key will automaticly insert the miles
- SER NO: 0 65535
  - (0) Serial number
- DATE: 1.00 12.99 (0) Mfg. date.

- NO STO: No stop key.
  - (0) Number of occurrences.
- KEY DN: Key stuck down at power up.
  - (0) Number of occurrences
- NO RPM: RPM feedback loss.
  - (0) Number of occurrences.
- SP CNG: Sudden speed change.
  - (0) Number of occurrences.
- EL STL: Elevation stall.
  - (0) Number of occurrences
- EL RNG: Elevation beyond 0-15% range during reset.
  - (0) Number of occurrences.
- EL LOST: Elevation beyond 0-15% range after reset
  - (0) Number of occurrences.
- EL NOZ: Elevation loss when seeking 0%.
  - (0) Number of occurrences.
- ELZERO: Represents 0%. (240)
- ELMAX: Represents 15%. (57)

# The following variables store the condition when the last error occurred:

- LSTERR: Displays last error code by #.
  - 18 = NO STO 22 = EL STL
  - 19 = KEY DN 23 = EL RNG
  - 20 = NO RPM 24 = EL LOST
  - 21 = SP CNG 25 = EL NOZ
- LSTELV: Target elevation prior to error.
- LSTPOT: Elevation feedback (count).
- LSTRES: 1=Resetting 0% at start-up. 2=Finished resetting 0%.
- LSTSSP: Set speed prior to error.
- LSTPWM: PWM number.
- LSTMSP: Measured speed.
- LST TM: Elapsed time since last error code.